RRC-SMB-4BC

4-bay standard battery charger
for smart batteries

P/N: 110329



Picture only for reference

Features

- 100W 4-bay charger
- Prioritized charging possible: faster charging of one bay integrated, triggered by push button
- For the standard battery form factors RRC203x, RRC204x, and RRC205x
- Optimized charging process for RRC batteries:
  - Longer cycle life
  - Faster charging
- Simple operation – Plug and Play
- External power supply for worldwide use
- Country-specific AC input cables available

Applications

Standard desktop charger for smart batteries powering mobile devices used in e.g. medical, industrial, and consumer markets.

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Specification

Input	
Voltage	19.00 – 24.00VDC
Current	5.3A max.
Power	100.00W
Protection	Over-current (fuse protected), under voltage

Output	
Voltage	0 - 17.40VDC
Current	0 - 4.70A
Voltage tolerance	±1% max.
Current tolerance	±10% max. @1.0A, ±3% max. @4.00A
Charge power	100.00W max., two charging sources with 50.00W each
Protection	Short circuit, over temperature shutdown, input-/output over current

Environmental	Operation:	Storage:
Ambient Temperature	0°C to 40°C	-30°C to 80°C
Pressure & Altitude	1060hPa to 533hPa -382m to 5000m	1060hPa to 533hPa -382m to 5000m
Humidity (non-condensing)	5% to 90% r.H.	5% to 90% r.H.

General	
Efficiency	~95% at 100% load
Indicator	Multi-color LED (green, red, yellow, white)
Battery types	Standard battery form factors RRC203x, RRC204x and RRC205x
Green procurement	RoHS 2011/65/EU + 2015/863/EU REACH 1907/2006 WEEE 2012/19/EU Chinese RoHS
Cooling	convection cooled

LED Indications	
White blinking (1-2 seconds)	Charger is plugged in
LED off	Charger is ready for use, and no battery is installed
Red blinking	Charger has an error
White blinking	Battery is plugged in and recognized
White breathing (slow blinking)	Battery is charging. SoC below 100%
Green continuously illuminated	Battery is fully charged
Yellow blinking	Reversible errors
Red continuously illuminated	The battery has a severe defect, or it is a non-smart battery
White light (Illumination ring)	The prioritized charging mode for the left bay is activated: Continuous charging of the left bay at the highest allowed speed. The other bays operate with reduced charging power.

Charger Mechanical Details	
Housing dimensions (LxWxH)	220x120x46 (mm)
Weight	~420g (without power supply)

Safety & EMC	In combination with included external AC/DC power supply	
Regulatory approvals	Europe International	EN62368-1 (CE) IEC62368-1 (CB)
Electromagnetic Emissions	Europe USA Canada Korea	EN55032, EN55035, level B FCC15 class B ICES-003 KCC
Electromagnetic Immunity	Electromagnetic field immunity EFT / Burst Surge Conducted Immunity Magnetic Fields Voltage dips, short instrumentations & voltage variations	EN/IEC61000-4-3 EN/IEC61000-4-4 EN/IEC61000-4-5 EN/IEC61000-4-6 EN/IEC61000-4-8 EN/IEC61000-4-11

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Specification for external AC/DC power supply (PS100)

P/N: 212532

Input	
Voltage	100.00 – 240.00VAC ±10%, 50-60Hz
Stand by power	< 0.15W @ no load

Output	
Voltage range	20.00VDC ± 5%
Power	100.00W max.
Current range	5.00A max.
Protection	Short circuit, over voltage, over current, over temperature

General	
Efficiency	California's Energy Efficiency Level VI
Ripple & Noise	380mV (p-p)

Power Supply Mechanical Details	
Standard output connector	DC barrel jack, 5.5 x 2.5 x 11mm
Housing dimensions (LxWxH)	127 x 51 x 30mm
Weight	325g ± 5%
Cable length	1600mm ± 50mm

Regulatory Approvals		
Approvals	Europe	CE
	International	CB
	USA & Canada	cULus
	Australia	RCM
	Russia (Customs Union)	EAC
	Korea	KC
	China	CCC
	Japan	PSE
	India	BIS
	Taiwan	BSMI
	Thailand	TISI
	Mexico	NOM
	Argentina	IRAM
	South Africa	SABS
	Singapore	Safety Mark
	United Kingdom	UKCA
	Morocco	CMIM
	South Africa	S-Mark
	Israel	SII

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Recommended Accessories

Type	Product	P/N	Application
3-pol AC-Cable 	US-Version EU-Version UK-Version AU-Version CN-Version	210950 210951 211133 211134 211959	Country-specific power cable for standard battery chargers from RRC and PS100.
Car Adapter DC/DC 	RRC-SMB-CAR	110041	90W car adapter with USB charging port. Power supplying in cars and trucks for standard battery chargers and power management modules from RRC or mobile devices.

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